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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/071,797	02/06/2002	Timothy V. Travaille	2050.020US1	2867

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EXAMINER
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BOYCE, ANDRE D

ART UNIT	PAPER NUMBER
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3623

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06/06/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/071,797	<b>Applicant(s)</b> TRAVAILLE, TIMOTHY V.	
	<b>Examiner</b> Andre Boyce	<b>Art Unit</b> 3623	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 05 April 2007.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-3,5-13 and 16-41 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-3,5-13 and 16-41 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on April 5, 2007 has been entered.
2. Claims 1, 19, 21, 27, 31, 34 and 36 have been amended. Claim 4 has been canceled. Claims 1-3, 5-13 and 16-41 are pending.

### ***Claim Rejections - 35 USC § 103***

3. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
4. Claims 1-3, 5-13 and 16-41 are rejected under 35 U.S.C. 103(a) as being unpatentable over McClure et al (USPN 6,250,548), in view of Lemmons (US 2003/0028873).

As per claim 1, McClure et al disclose a computer-implemented method of collecting votes from at least some of a group of voters (i.e., electronic voting system 40, figure 1), comprising: broadcasting an interactive voting application to a plurality of remote broadcast receivers (i.e., internet voting software transmitted to PCs via

public, private or semi-private servers, column 35, lines 27-30 and a plurality of voting tablets located at voting stations, column 17, lines 5-9); receiving from at least some of the broadcast receivers authentication information associated with one or more voters (i.e., voter PIN, column 36, lines 28-31); authenticating the voters by comparing the received authentication information with stored authentication information associated with the voter (i.e., password given at time of registration, column 36, lines 35-39); and receiving electronic ballots from the broadcast receivers, each electronic ballot comprising a set of votes inputted into the broadcast receiver by a voter using the interactive voting application (i.e., voter is able to cast one ballot, column 36, lines 66-67), each vote being associated with a sequential identification number (i.e., assignment of an issue number, column 36, lines 59-61).

McClure does not disclose broadcasting from at least one of a list including a satellite uplink and a cable head-end. Lemmons discloses a viewer able to cast a vote for elections (§ 0047), wherein the data files may be stored in a central computer, comprising a server located at a head-end or in a set top box and wherein the enhanced video signal is transmitted via a satellite link (§ 0058). Both McClure et al and Lemmons are concerned methods of casting votes, therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to include head-end or a set top box in McClure et al, as seen in Lemmons, as an additional efficient mechanism to capture votes, thus making the system more flexible and robust.

As per claim 2, McClure et al disclose delivering ballot data to an election board (i.e., election officials can download the ballot image, column 37, lines 51-54), the ballot data derived from the electronic ballots and whether the voters have voted, wherein the identities of the voters are not associated with the voters' electronic ballots (i.e., once the voter activates the cast ballot button, the software randomly saves the ballot image in a secure database, column 37, lines 32-36).

As per claim 3, McClure et al disclose delivering ballot data comprises electronically transmitting the ballot data to a server controlled by the election board (i.e., semi-private server set up for multiple jurisdictions, column 35, lines 40-42).

As per claim 5, McClure et al disclose the stored authentication information was received from an election board (i.e., password given at time of registration, column 36, lines 37-39).

As per claims 6 and 8, McClure et al disclose the authentication information for each voter includes: a unique personal identification number assigned to the voter by the election board (i.e., voter PIN); and a secret information item specified by the voter (i.e., password and biometric identification, column 36, lines 37-39).

As per claim 7, McClure et al disclose recording the electronic ballots and that the voters have voted, wherein the identities of the voters are not associated with the electronic ballots (i.e., once the voter activates the cast ballot button, the software randomly saves the ballot image in a secure database, column 37, lines 32-36).

As per claim 9, McClure et al disclose determining whether the broadcast receiver from which the voter's authentication information was received is among a

set of broadcast receivers pre-approved for use by the voter (i.e., officials verify the information and approve assignment of an issue number, column 36, lines 59-63).

As per claim 10, McClure et al disclose the set of broadcast receivers pre approved for use by a voter includes a broadcast receiver in a polling place (i.e., voting tablet 56, column 17, lines 5-9).

As per claim 11, McClure et al disclose the set of broadcast receivers pre-approved for use by a voter includes broadcast receivers located in same geographical area as the voter's residence (i.e., PC may be located in voter's residence).

As per claim 12, McClure et al disclose for each voter, determining a set of pre-approved broadcast receivers (i.e., PC that supports SSL protocol, column 36, lines 33-35).

As per claim 13, McClure et al disclose determining a set of pre-approved broadcast receivers for each voter comprises: determining a geographic location code for the voter according to the voter's residence (i.e., voter jurisdiction, column 35, lines 34-37); and including in the set of pre-approved broadcast receivers broadcast receivers at polling places assigned to the voter's geographic location code (i.e., plurality of voting tablets at voting stations in polling place, column 17, lines 5-9).

As per claim 16, McClure et al disclose disassociating the identity of each voter from the voter's electronic ballot, so that the voter's votes are not associated with the voter's identity (i.e., information related to communication between software host and

voter are saved randomly as a file and disassociated with the cast ballot, column 37, lines 45-48).

As per claim 17, McClure et al disclose delivering a first and second report to an election board (i.e., once voter has activated the cast ballot button, thus voting, the election official can download the ballot image, column 37, lines 51-54), the first report describing whether a set of voters voted and the second report describing the voters' votes, wherein the voters described in the first report cannot be correlated with their votes described in the second report.

As per claim 18, McClure et al disclose at least one of the broadcast receivers is located in a polling place (i.e., voting tablets, column 17, lines 5-9).

As per claim 19, McClure et al disclose a computer-implemented method of collecting votes from a plurality of voters (i.e., electronic voting system 40, figure 1) comprising: storing the votes from the electronic ballots and data relating to which voters submitted electronic ballots, wherein the voters are not correlateable with their votes (i.e., once the voter activates the cast ballot button, the software randomly saves the ballot image in a secure database, column 37, lines 32-36), each vote being associated with a sequential identification number (i.e., assignment of an issue number, column 36, lines 59-61)..

McClure does not disclose transmitting in a broadcast television signal an interactive voting application to a plurality of set-top boxes, the set-top boxes adapted to receive the broadcast television signal, to extract the interactive voting application from the signal, and to execute the voting application and display the

voting application on a television operatively coupled thereto; and receiving electronic ballots from the plurality of set-top boxes. Lemmons discloses a viewer able to cast a vote for elections (§ 0047), wherein the data files may be stored in a central computer, comprising a server located at a head-end or in a set top box (§ 0058). Both McClure et al and Lemmons are concerned methods of casting votes, therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to include transmitting in a broadcast television signal an interactive voting application to a plurality of set-top boxes in McClure et al, as seen in Lemmons, as an additional efficient mechanism to capture votes, thus making the system more flexible and robust.

As per claim 20, McClure et al disclose transmitting to an election board data relating to the votes and which voters submitted ballots (i.e., once voter has activated the cast ballot button, thus voting, the election official can download the ballot image, column 37, lines 51-54).

As per claim 21, McClure et al disclose a interactive method for voting (i.e., electronic voting system 40, figure 1), comprising: decoding an interactive voting application contained in the broadcast signal (i.e., software decrypts the transmission, column 37, lines 30-32); executing the interactive voting application to receive votes from a vote; creating an electronic ballot from the received votes; and transmitting the electronic ballot to a remote server (i.e., once voter has activated the cast ballot button, thus voting, the election official can download the ballot image,



column 37, lines 51-54), each vote being associated with a sequential identification number (i.e., assignment of an issue number, column 36, lines 59-61).

McClure does not disclose tuning a broadcast receiver, from at least one of a list including a satellite uplink and a cable head-end, to a voting channel, the broadcast receiver receiving a broadcast signal, containing an interactive voting application, on the voting channel. Lemmons discloses a viewer able to cast a vote for elections (§ 0047), wherein the data files may be stored in a central computer, comprising a server located at a head-end or in a set top box (§ 0058), wherein the set-top box receives and transmits the enhanced signal to a display device such as a TV screen (§ 0060). Both McClure et al and Lemmons are concerned methods of casting votes, therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to include head-end or a set top box in McClure et al, as seen in Lemmons, as an additional efficient mechanism to capture votes, thus making the system more flexible and robust.

As per claim 22, McClure et al disclose submitting authentication information to the remote server (i.e., voter PIN, column 36, lines 27-30).

As per claim 23, McClure et al disclose the authentication information includes: a unique personal identification number (i.e., voter PIN, column 36, lines 27-30); and a secret information item (i.e., password and biometric identification, column 36, lines 37-39).

As per claim 24, McClure et al disclose the electronic ballot includes information for authenticating the ballot (i.e., voter PIN, column 36, lines 27-30).

As per claim 25, McClure et al disclose the electronic ballot is encrypted (i.e., column 37, lines 26-29).

As per claim 26, McClure et al does not disclose transmitting the electronic ballot over a two-way cable connection. Lemmons discloses a viewer able to cast a vote for elections (§ 0047), wherein the data files may be stored in a central computer, comprising a server located at a head-end or in a set top box (§ 0058). Both McClure et al and Lemmons are concerned methods of casting votes, therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to include a two-way cable connection in McClure et al, as seen in Lemmons, as an additional efficient mechanism to capture votes, thus making the system more flexible and robust.

Claims 27-30 are rejected based upon the rejection of claims 19 and 20, since they are the system claims corresponding to the method claims.

Claims 31-33 are rejected based upon the rejection of claims 19-22, since they are the system claims corresponding to the method claims.

As per claim 34, McClure et al disclose an application, comprising: an interactive voting application (i.e., electronic voting system 40, figure 1), for being executed on a plurality of remote broadcast receivers, the interactive voting application including, an input interface for receiving information from a voter (i.e., voter's computer monitor, column 37, lines 20-22); an output interface for transmitting data to a remote server (i.e., voter activates the cast ballot button, column 37, lines 26-29); an authentication module adapted to collect authentication information from the voter

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using the input interface, and further adapted to transmit the authentication information to the remote server using the output interface (i.e., approval of an issue number based upon voter supplied information, column 36, lines 59-61); and a ballot module adapted to create an electronic ballot based on vote selections received from the voter (i.e., converts responses of the voter into equivalent switch positions for the voting tablet, column 37, lines 30-32), and further adapted to transmit the electronic ballot to the remote server (i.e., transmits the data package to internet software host, column 37, lines 26-29), each vote being associated with a sequential identification number (i.e., assignment of an issue number, column 36, lines 59-61).

McClure does not disclose transmitting via at least one of a list including a satellite uplink and a cable head-end. Lemmons discloses a viewer able to cast a vote for elections (§ 0047), wherein the data files may be stored in a central computer, comprising a server located at a head-end or in a set top box and wherein the enhanced video signal is transmitted via a satellite link (§ 0058). Both McClure et al and Lemmons are concerned methods of casting votes, therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to include head-end or a set top box in McClure et al, as seen in Lemmons, as an additional efficient mechanism to capture votes, thus making the system more flexible and robust.

As per claim 35, McClure et al disclose wherein the authentication information includes: a unique personal identification number assigned to the voter by an election board (i.e., voter PIN, column 36, lines 27-30); and a secret information item

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specified by the voter (i.e., password and biometric identification, column 36, lines 37-39).

Claim 36 is rejected based upon the rationale of the rejection of claim 34, since it is the broadcast signal claim corresponding to the interactive voting application claim.

As per claim 37, McClure et al disclose wherein the interactive voting application is encoded within a vertical blanking interval of the broadcast signal (i.e., encryption, column 37, lines 26-27).

As per claim 38, McClure et al disclose the interactive voting application is digitally encoded within the broadcast signal (i.e., executable code stored, column 37, lines 26-29).

As per claim 39, McClure et al does not disclose a broadcast program. Lemmons discloses a viewer able to cast a vote for elections (§ 0047), wherein the data files may be stored in a central computer, comprising a server located at a head-end or in a set top box (§ 0058), wherein the enhanced video signal is transmitted via cable connection and transmitted to a TV, (§ 0060). Both McClure et al and Lemmons are concerned methods of casting votes, therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to include a broadcast program in McClure et al, as seen in Lemmons, as an additional efficient mechanism to capture votes, thus making the system more flexible and robust.

As per claim 40, McClure et al disclose wherein the interactive voting application is encoded within a vertical blanking interval of the broadcast signal (i.e., encryption, column 37, lines 26-27).

As per claim 41, McClure et al disclose the interactive voting application is digitally encoded within the broadcast signal (i.e., executable code stored, column 37, lines 26-29).

### ***Response to Arguments***

5. In the Remarks, Applicant argues that the Examiner uses hindsight reconstruction and that there has been no showing of motivation to combine the references. The Examiner respectfully disagrees and submits that it must be recognized that any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See *In re McLaughlin*, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971). In addition, as discussed in the *KSR International Co. v. Teleflex Inc. et al.*, 550 U.S. \_\_\_\_ (2007), "[o]ften, it will be necessary for a court to look to interrelated teachings of multiple patents; the effects of demands known to the design community or present in the marketplace; and the background knowledge possessed by a person having ordinary skill in the art, all in order to determine whether there was an apparent reason to combine the known

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elements in the fashion claimed by the patent at issue. To facilitate review, this analysis should be made explicit. See *In re Kahn*, 441 F. 3d 977, 988 (CA Fed. 2006) ('[R]ejections on obviousness grounds cannot be sustained by mere conclusory statements; instead, there must be some articulated reasoning with some rational underpinning to support the legal conclusion of obviousness'). As our precedents make clear, however, the analysis need not seek out precise teachings directed to the specific subject matter of the challenged claim, for a court can take account of the inferences and creative steps that a person of ordinary skill in the art would employ" (emphasis added). Here, both McClure et al and Lemmons are concerned methods of casting votes and one of ordinary skill in the art would have combined McClure et al with Lemmons, in order to provide an additional efficient mechanism to capture votes, thus making the McClure et al system more flexible and robust.

Applicant also argues that McClure et al does not teach each electronic ballot comprising a set of votes inputted into the broadcast receiver by a voter using the interactive voting application, each vote being associated with a sequential identification number. The Examiner respectfully disagrees and submits that McClure et al discloses each electronic ballot comprising a set of votes inputted into the broadcast receiver by a voter using the interactive voting application (i.e., voter is able to cast one ballot, column 36, lines 66-67), each vote being associated with a sequential identification number (i.e., assignment of an issue number, column 36, lines 59-61). As discussed by Applicant, each ballot in McClure et al has one issue

number that identifies that ballot, however, Applicant incorrectly concludes that as a result, McClure et al does not disclose each vote being associated with a sequential identification number. Contrary to Applicant's narrow interpretation of McClure et al, each vote is indeed associated with a sequential identification number, because each vote on the ballot is inherently associated with the issue number that identifies the ballot. In other words, every vote on the ballot is associated with a sequential number, i.e., the issue number. As a result, McClure et al indeed teaches each vote being associated with a sequential identification number.

### ***Conclusion***

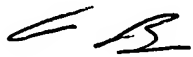
6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Andre Boyce whose telephone number is (571) 272-6726. The examiner can normally be reached on 9:30-6pm M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Tariq Hafiz can be reached on (571) 272-6729. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

adb  
June 1, 2007

  
ANDRE BOYCE  
PATENT EXAMINER  
AU 3623